

Alexey V Borisov

List of Publications by Year in descending order

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49
papers

192
citations

1477746

6
h-index

1199166

12
g-index

49
all docs

49
docs citations

49
times ranked

141
citing authors

#	ARTICLE	IF	CITATIONS
1	Application of machine learning and laser optical-acoustic spectroscopy to study the profile of exhaled air volatile markers of acute myocardial infarction. Journal of Breath Research, 2021, 15, 027104.	1.5	16
2	Paraffin-Embedded Prostate Cancer Tissue Grading Using Terahertz Spectroscopy and Machine Learning. Journal of Infrared, Millimeter, and Terahertz Waves, 2020, 41, 1089-1104.	1.2	14
3	Measurement and modeling of optical properties of heated adipose tissue in the terahertz range. , 2020, , .		1
4	Breathomics for Lung Cancer Diagnosis. , 2020, , 209-243.		1
5	Differential diagnostics of paraffin-embedded tissues by IR-THz spectroscopy and machine learning. , 2020, , .		0
6	Electroencephalography Registration of Laser Acupuncture Action on Children with Autism Disorder. , 2020, , .		2
7	The study of spectral changes in THz range in normal and pathological skin in vivo depending on the dehydration methods used. , 2020, , .		0
8	Study of wound healing by terahertz spectroscopy. , 2020, , .		0
9	Analysis of the Spectral Characteristics of Promising Liquid Carriers in the Terahertz Spectral Range. Russian Physics Journal, 2019, 62, 400-405.	0.2	6
10	CREATION OF A MAGNETIC DRIVEN GATE FOR THZ RAYS. Progress in Electromagnetics Research M, 2019, 80, 103-109.	0.5	3
11	Use of Terahertz Spectroscopy for in vivo Studies of Lymphedema Development Dynamics. Optics and Spectroscopy (English Translation of Optika I Spektroskopiya), 2019, 126, 523-529.	0.2	3
12	Research of Magnetic Fluid in the THz Frequency Range. , 2019, , .		1
13	Medical diagnosis using NIR and THz tissue imaging and machine learning methods. , 2019, , .		3
14	Application of multiphoton imaging and machine learning to lymphedema tissue analysis. Biomedical Optics Express, 2019, 10, 3353.	1.5	22
15	Laser photoacoustic spectroscopy applications in breathomics. Journal of Biomedical Photonics and Engineering, 2019, 5, 010303.	0.4	8
16	Lymphedema tissue analysis using optical imaging and gradient processing. , 2019, , .		0
17	The study of paraffin-embedded tissue using multiphoton microscopy. , 2019, , .		0
18	THz spectroscopy of emanation from the skin of patients the diabetes mellitus. , 2019, , .		0

#	ARTICLE	IF	CITATIONS
19	Visualization of biological nano-objects with the help of multiphoton microscopy. , 2019, , .		1
20	Influence of laser acupuncture on EEG characteristics. , 2019, , .		0
21	Visualization of the lymphedema tissue internal structure by monitoring of backscattering. , 2019, , .		0
22	Structure imaging of biological tissue by optical coherence elastography. , 2019, , .		0
23	Applications of THz laser spectroscopy and machine learning for medical diagnostics. EPJ Web of Conferences, 2018, 195, 10006.	0.1	4
24	Magneto-Optical Properties of a Magnetic Fluid in the THz Frequency Range. , 2018, , .		4
25	Investigation of glycation products by THz time-domain spectroscopy. , 2018, , .		0
26	Diagnosis of oral lichen planus from analysis of saliva samples using terahertz time-domain spectroscopy and chemometrics. Journal of Biomedical Optics, 2018, 23, 1.	1.4	14
27	Possibilities of cytospectrophotometry of oncological prostate cancer tissue analysis in the TGz spectral range. , 2018, , .		1
28	Investigation of the electric field distribution in the human brain based on MRI and EEG data. , 2018, , .		0
29	Analysis of exhaled air of patients with myocardial infarction by laser spectroscopy and data mining. , 2018, , .		1
30	Exhaled air analysis using wideband wave number tuning range infrared laser photoacoustic spectroscopy. Journal of Biomedical Optics, 2017, 22, 017002.	1.4	26
31	Diagnostics of oral lichen planus based on analysis of volatile organic compounds in saliva. , 2017, , .		1
32	Spectral characteristics of magnetic fluid with particles of different dimensions in the terahertz frequency range. , 2017, , .		3
33	Possibilities of laser spectroscopy for monitoring the profile dynamics of the volatile metabolite in exhaled air. Proceedings of SPIE, 2016, , .	0.8	0
34	Breath air measurement using wide-band frequency tuning IR laser photo-acoustic spectroscopy. , 2016, , .		1
35	The classification of the patients with pulmonary diseases using breath air samples spectral analysis. AIP Conference Proceedings, 2016, , .	0.3	2
36	Classification of patients with broncho-pulmonary diseases based on analysis of absorption spectra of exhaled air samples with SVM and neural network algorithm application. , 2016, , .		6

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37	Wavelet based de-noising of breath air absorption spectra profiles for improved classification by principal component analysis. AIP Conference Proceedings, 2015, , .	0.3	2
38	Determination of component concentrations in models of exhaled air samples using principal component analysis and canonical correlation analysis. , 2015, , .		5
39	Statistical approach to the analysis of the composition of multicomponent gas mixtures using absorption laser spectroscopy. Proceedings of SPIE, 2015, , .	0.8	0
40	Analysis of the component composition of exhaled air using laser spectroscopy and canonical correlation analysis. , 2015, , .		2
41	The reveal of a set of informative features in the task of diagnosis on a base of exhaled air absorption spectra analysis using nonparametric algorithms of pattern recognition. Proceedings of SPIE, 2015, , .	0.8	0
42	Applications of principal component analysis to breath air absorption spectra profiles classification. , 2015, , .		12
43	Solutions of the Grossâ€Pitaevskii Equation in Prolate Spheroidal Coordinates. Russian Physics Journal, 2015, 57, 1201-1209.	0.2	0
44	Space-time distribution of the electric field in the He-N ₂ -plasma of a beam-type high-voltage pulsed discharge. Russian Physics Journal, 2013, 55, 1222-1228.	0.2	5
45	Monte-Carlo calculation of the electron energy distribution function of a Heâ€N ₂ plasma of a high-voltage pulsed discharge. Russian Physics Journal, 2013, 56, 486-488.	0.2	6
46	Investigation of the spatiotemporal characteristics of the electric field in the Ne-H ₂ plasma of a beam-type high-voltage pulsed discharge. Physics of Plasmas, 2013, 20, 123501.	0.7	4
47	Evolution of initial distributions with one and two centers in a two-dimensional model of the reaction-diffusion type with a nonlocal interaction of finite radius. Russian Physics Journal, 2011, 54, 32-38.	0.2	6
48	Numerical simulation of the one-dimensional population dynamics with nonlocal competitive losses and convection. Russian Physics Journal, 2011, 54, 479-484.	0.2	6
49	Transverse Evolution Operator for the Gross-Pitaevskii Equation in Semiclassical Approximation. Symmetry, Integrability and Geometry: Methods and Applications (SIGMA), 2005, , .	0.5	0